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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/017,923

10/30/2001

Keicy K. Chung

264/031

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04/24/2006

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EXAMINER

REFAI, RAMSEY

ART UNIT

PAPER NUMBER

2152

DATE MAILED: 04/24/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/017,923

Applicant(s)

CHUNG, KEICY K.

Examiner

Ramsey Refai

Art Unit

2152

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 16 February 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) 10 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-9 and 11-16 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 9/27/02, 1/13/03, 11/29/04
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Response to Amendment

Responsive to Response to Election/Restriction received February 16, 2006. Claim 10 has been withdrawn. Claim 16 is new. Claims 1-9 and 11-16 remain pending further examination.

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 1-9 and 11-16 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter, which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The claims contain the following limitations which are not described in the specification: “the computer interface is adapted to enable communications *exclusively* between the computer and the processor”, “the processor is adapted to employ the network interface for communications *exclusively* with the remote file server”, “the computer interface is adapted to enable communications *exclusively* between the computer and the storage device”, and “localized to a computer”.

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.

4. Claims 1-9 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

uter” is indefinite because the definition of this term is unclear and the use of this limitation renders the claims vague and indefinite. Claims 2-3, 5-6, and 8-9 depend on the above

and 8-9 depend on the above rejected claims and contain all the features of their respective parent claim; therefore these claims are rejected under the same rationale.

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

6. Claims 7 and 9 are rejected under 35 U.S.C. 102(e) as being unpatentable by Jacobs et al (U.S. Patent No. 6,732,237).

7. As per claim 7, A method of providing a file to a computer comprising:

receiving in a storage device a request from the computer for the file, wherein the storage device is localized to the computer and includes a storage means and a computer interface, the computer interface being adapted to enable communications exclusively between the computer and the storage device; (Figure 1, Figure 3, 300)

determining whether the file is cached on the storage means; determining, if the file is not cached on the storage means, whether the file is available from a remote file server, and if the file is available from the remote file server, retrieving the file from the remote file server and caching the retrieved file on the storage means; and providing to the computer the file on a read-only basis if the file is cached on the storage means (Figure 3, column 9, line 3-column 10, line 67).

8. As per claim 9, Jacobs et al teach deleting the cached file from the storage means upon receiving a command from the file server to delete the cached file (column 6, lines 39-47).

Claim Rejections - 35 USC § 103

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

10. Claims 1-6, 8, 11-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobs et al (U.S. Patent No. 6,732,237) in view of "Official Notice".

11. As per claim 1, Jacobs et al teach a storage device comprising:

a processor localized to a computer; a computer interface communicably connected to the processor, wherein the computer interface is adapted to enable communications exclusively between the computer and the processor; a network interface communicably connected to the processor to enable the processor to communicate with a remote file server, wherein the processor is adapted to employ the network interface for communications exclusively with the remote file server (**Figure 1, column 4, lines 15-37**); and

a storage means communicably connected to the processor, the processor being adapted to have read and write access to the storage means, wherein upon receipt of a file request from the computer (**Figure 3, 300**) the processor is adapted to sequentially (1) determine whether the file is cached on the storage means and provide the file to the computer on a read-only basis if the file is cached on the storage means (**Figure 3, 302; column 9, lines 3-21**), (2) request the file from the file server if the file is not cached on the storage means, and if the file is obtainable from the file server, cache the obtained file on the storage means and provide the obtained file to the computer on a read-only basis (**Figure 3**).

Jacobs et al fail to explicitly teach that the processor returns a file unavailable notice to the computer if the file is not cached on the storage means and not obtainable from the file server. However, However, "Official Notice" is taken that both the concept and advantage of using a file unavailable notice

such as a “404-File Not Found “ error message is well known and expected in the art. It would have been obvious to one of the ordinary skill in the art at the time of the applicant's invention to include a file unavailable notice in Jacobs et al's system because doing so would inform a user that the data that the user has requested is unavailable.

12. As per claims 2, Jacobs et al teach wherein the computer is communicably connected to a network server through the network interface (**Figure 1, column 4, lines 15-37**).

13. As per claim 3, Jacobs et al teach wherein the storage means comprises random access media (**Figure 1, column 4, lines 15-37**).

14. As per claim 4. A computer network comprising:

a file server; a network server; a computer communicably connected to the network server, the computer being remotely disposed from the file server and the network server (**Figure 1**);

a storage device (**cache server**) communicably connected to the computer and the file server, the storage device being localized to the computer and comprising a processor, a computer interface, a network interface, and a storage means wherein the computer interface is adapted to enable communications exclusively between the computer and the storage device; the processor is adapted to employ the network interface for communications exclusively with the remote file server ; the processor is adapted to have read and write access to the storage means (**Figure 1, column 4, lines 15-37**); and

upon receipt of a file request from the computer (**Figure 3, 300**) the processor is adapted to sequentially (1) determine whether the file is cached on the storage means and provide the file to the computer on a read-only basis if the file is cached on the storage means (**Figure 3, 302; column 9, lines 3-21**), (2) request the file from the file server if the file is not cached on the storage means, and if the file is obtainable from the file server, cache the obtained file on the storage means and provide the obtained file to the computer on a read-only basis (**Figure 3**).

Jacobs et al fail to explicitly teach that the processor returns a file unavailable notice to the computer if the file is not cached on the storage means and not obtainable from the file server. However, However, "Official Notice" is taken that both the concept and advantage of using a file unavailable notice such as a "404-File Not Found" error message is well known and expected in the art. It would have been obvious to one of the ordinary skill in the art at the time of the applicant's invention to include a file unavailable notice in Jacobs et al's system because doing so would inform a user that the data that the user has requested is unavailable.

15. As per claim 5, Jacobs et al teach wherein the computer is communicably connected to the network server through the storage device (**Figure 1, column 4, lines 15-37**).

16. As per claim 6, Jacobs et al teach wherein the storage means comprises random access media (**Figure 1, column 4, lines 15-37**).

17. As per claim 8, Jacobs et al fail to teach providing to the computer a response indicating that the file is not available if the file is not cached on the storage means. However, However, "Official Notice" is taken that both the concept and advantage of using a file unavailable notice such as a "404-File Not Found" error message is well known and expected in the art. It would have been obvious to one of the ordinary skill in the art at the time of the applicant's invention to include a file unavailable notice in Jacobs et al's system because doing so would inform a user that the data that the user has requested is unavailable.

18. As per claims 11 and 14, Jacobs et al contains the similar limitations as claim 1, but now teaches that the file is a bootstrap file or an operating system file. Although Jacobs et al does not explicitly teach that the particular file type is a bootstrap file or an operating system, Jacobs et al do teach that the requested data maybe include textual, numerical, multi-media, or other types and forms of information suitable for transmission to a user through a network and may adhere to any of a variety of protocols or formats (e.g. HTTP, FTP, HTML, XML) (**column 5, line 66-column 6, line 5**). It would have been

obvious to one of the ordinary skill in the art at the time of the applicant's invention to recognize that it was merely a matter of choice of implementation, which clearly does not require any inventive step. Since the determination process is accomplished by assigning file names, extensions or the like, as a determination parameter, changing the file type is obvious and is not patentably distinct over Jacobs et al.

19. As per claim 12, Jacobs et al teach wherein the computer is communicably connected to a network server through the network interface (**Figure 1, column 4, lines 15-37**).

20. As per claim 13, Jacobs et al teach wherein the storage means comprises random access media (**Figure 1, column 4, lines 15-37**).

21. As per claim 15, Jacobs et al teach wherein the computer is communicably connected to the network server through the storage device (**Figure 1, column 4, lines 15-37**).

22. As per claim 16, Jacobs et al teach deleting the cached file from the storage means upon receiving notice from the file server that an updated version of the cached file is available (**column 6, lines 39-47**).

Response to Arguments

23. Applicant's arguments have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

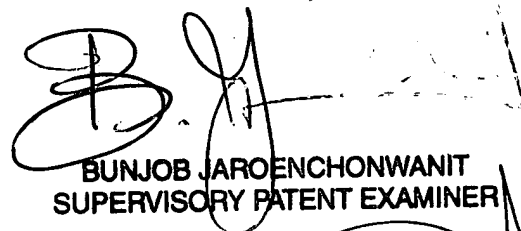
The prior art made of record and not relied upon is considered pertinent to applicant's disclosure are cited in the Notice of Reference Cited form (PTO-892).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ramsey Refai whose telephone number is (571) 272-3975. The examiner can normally be reached on M-F 8:30 - 5:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bunjob Jaroenchonwanit can be reached on (571) 272-3913. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Ramsey Refai
Examiner
Art Unit 2152



BUNJOB JAROENCHONWANIT
SUPERVISORY PATENT EXAMINER

